

NORTON BALL BEARING JACKS



CATALOGUE
No. 34

NORTON JACKS

CATALOGUE 34

*All Previous Catalogues
Cancelled*

SEPTEMBER, 1925



A. O. NORTON, INC.

ESTABLISHED 1886

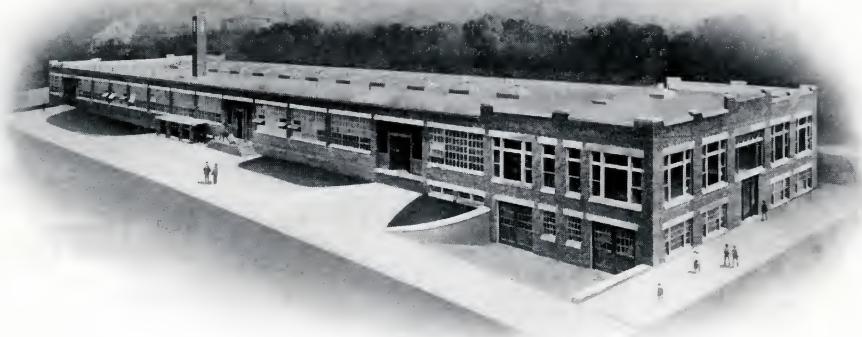
The Original Manufacturer of Ball-Bearing Jacks

Registered Cable Address, "Norjack," Boston

440 BROOKLINE AVE., BOSTON, MASS.
920 SOUTH MICHIGAN AVE., CHICAGO, ILLS.
COATICOOK, PROV. QUEBEC, CANADA

DISTRIBUTORS

CHICAGO, ILL.	R. H. HYLAND COMPANY
HOUSTON, TEXAS	J. W. CAIN COMPANY
NEW ORLEANS, LA.	WOODWARD, WIGHT & COMPANY, LIMITED
PHILADELPHIA, PA.	P. S. JUSTICE & COMPANY
PITTSBURGH, PA.	MAIN BELTING COMPANY
PORTLAND, OREGON	RAILWAY EQUIPMENT COMPANY
ST. LOUIS, MO.	LORENZO NORVELL COMPANY
SAN FRANCISCO, CAL.	M. G. WEST COMPANY
BEAUMONT, TEXAS	E. L. WILSON HARDWARE COMPANY
SEATTLE, WASH.	CLYDE EQUIPMENT COMPANY
MONTRÉAL, CANADA	MUSSENS LIMITED
WINNIPEG, MANITOBA	POWELL EQUIPMENT COMPANY, LIMITED
VANCOUVER, CANADA	CANADIAN FAIRBANKS MORSE & CO., LTD.
LONDON, ENGLAND	P. & W. MACLELLAN, LIMITED
GLASGOW, SCOTLAND	P. & W. MACLELLAN, LIMITED
PARIS, FRANCE	SOCIETE ANONYME LIDGERWOOD
MEXICO CITY, MEXICO	EAGLE MANUFACTURERS' SALES COMPANY
SYDNEY, AUSTRALIA	AUSTRALIAN FAIRBANKS MORSE & CO., LTD.



BOSTON, (MASS.) PLANT



COATICOOK, (PROV. QUEBEC) CANADA, PLANT



Partial view of our inspection department. NORTON inspection is rigid.



Section of our Engineering Department. Forty years of experience in building jacks—just jacks—guides us in our designs and specifications.

NORTON JACKS have quality built into them. That is why *they are preferred by the majority of leading railroads and industrial establishments.*

Below—One corner of the huge machine shop in our Boston Plant.



Below—Testing NORTON jacks. Every jack we make is given a *severe overload* test on these machines.



A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON BALL-BEARING JACKS

FORTY years of continuous effort to build the most perfect lifting jacks in the world has resulted in our *leadership* in this line. Every worth while improvement in jacks has been originated by this company, and along with a policy of fair dealing, has built up the greatest business of its kind in the world.

NORTON jacks are rightfully called "*GOOD JACKS.*" Nothing is spared in their manufacture to produce the lightest weight, most efficient, fastest and safest jacks made. They are different from others and are recognized as the *STANDARD JACK* by the leading railroads.

Every part entering into NORTON jacks is carefully made and of the best material suitable for the function the part is to perform, and this with modern factory equipment and methods keeps NORTON quality unsurpassed.

Ball-Bearing jacks are ORIGINAL with us. This type of construction has far outdistanced all other designs. Large balls, of the highest quality, and well machined bearing races account, to a considerable degree, for the easy operation of NORTON jacks.

Our Self-Lowering types represent the highest development of modern jack construction. This, too, was originated by us, and rapidly became popular on account of its simplicity, speed and safety.

To protect the user and purchaser of NORTON jacks, the name NORTON is cast on every one. If you do not find this name on a jack it is not a GENUINE NORTON product.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

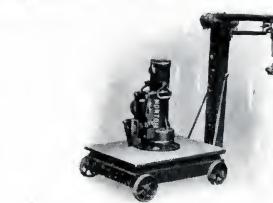
SOME FEATURES OF NORTON JACKS

LIGHT-WEIGHT CONSTRUCTION

By skillful engineering and selection of materials we have been able to cut weight down to a minimum and yet produce a jack that will stand up under extreme conditions.

There is not one ounce of extra weight in NORTON jacks. This *modern light-weight construction* permits of easy handling and spotting under loads and workmen much prefer them to the out of date and cumbersome types.

Compare the weight of NORTON jacks with others.



Put a NORTON on the scales with any other make.

SELF-LOWERING DEVICE

No single improvement in jacks has ever contributed so much to the speed and safety, in operating heavy duty jacks, as our Self-Lowering device. Originated and perfected by our engineers this innovation quickly found favor with railroad men for it eliminates the slow, laborious and dangerous process of pumping or cranking down a jack under load.

Lowering a load with this device simply requires pushing a thumb lever and the jack goes down, fast or slow, *under perfect control of the operator*. The load can be stopped, at any point in its travel, by releasing the lever.



Merely pushing a lever lowers the jack.

Workmen like Self-Lowering jacks because they are safe and reliable.

HIGH LIFT

When doing certain work an inch or two more lift, than other jacks have, may be necessary. Our jacks are designed for high lift, which is a feature that gives NORTON jacks a wider range of usefulness.

EASE OF OPERATION

NORTON jacks lift their loads easily, as careful attention has been paid to all parts subjected to friction. Main screws and nuts are largely proportioned and highly finished; oilless bushings are provided at points that are not readily accessible to lubrication from the outside of the jack and liberal sized bearings, with means for oiling, are used elsewhere.

NORTON JACK MATERIALS

All materials entering into the construction of NORTON jacks are carefully selected according to strength requirements and with a view of keeping down the complete weight of the finished jack. Drop forgings, properly heat treated, are used extensively, therefore giving great strength and durability to the parts with minimum weight.

SHELLS AND STANDARDS

Steel and malleable iron castings are used in the standards and shells according to the size and design of the jack. These materials are *rigidly inspected* and only those castings that are thoroughly sound and up to our specifications, in all respects, find their way into the assembly of NORTON jacks.

GEARS

Our gears are cut from high grade carbon steel drop forgings after which they are heat treated to specified hardness. Modern automatic machinery, on which all gears are cut, insure greatest accuracy.

Considerable care has been exercised in the design of all gears and they are amply proportioned to withstand the particular duty each is to perform.

LIFTING SCREWS

A high grade, special alloy steel is used in this all-important part. Accurate machining, including an extra smooth finish and proper heat treatment, is responsible for the great strength and durability of this part.

SCREW NUT

This part, like the lifting screw, receives the entire thrust of the load placed upon the jack. Ordinary bronze, used in other jacks, will not give satisfactory service and only after extensive research have our engineers been able to specify a material that has the physical properties necessary to withstand the strain and abuse to which this part is subjected.

BALL-BEARINGS AND PLATES

Only highest grade balls, made from a special ball-bearing steel, and extremely accurate in roundness, are used in NORTON jacks. These are of liberal size, according to the capacity of the jack, and therefore will stand up under excessive loads.

Bearing plates are likewise accurately machined from high grade alloy steel and largely proportioned. These are heat treated to glass-like hardness, this hardness penetrating entirely through the plate. This insures against damage to ball and plate, a condition so common where the plate is merely case hardened.

Ball grooves in the plates used in our heavy duty jacks are ground to a mirror-like finish. This is another item which contributes considerably to the ease of operation and long life of NORTON jacks.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.



View showing mechanism of our Ball-Bearing, Self-Lowering Jacks.
Positively the finest heavy duty jacks ever produced.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

GENERAL INDEX

Section One—pages 9 to 14.

Jack Carriage.

Self-Lowering, Speed-Controlled Ball-Bearing Jacks. Inverted types.

Section Two—pages 15 to 20.

Self-Lowering Speed-Controlled Ball-Bearing Jacks. For light and heavy duty car work.

Section Three—pages 21 to 23.

Self-Lowering Bridge Jacks.

Self-Lowering Wrecking Jacks.

Section Four—pages 24 to 27.

Journal Jacks, Ball-Bearing.

Journal Jacks, Cone-Bearings.

General Industrial Purpose Jacks (Short lift).

Section Five—pages 28 to 37.

Bridge and Wrecking Jacks—Hand lowering.

Locomotive and General Purpose Jacks.

Inverted Ball-Bearing Bridge Jacks.

General Purpose Jacks with cone bearings.

Push and Pull Jacks.

Traversing Base Jacks.

Section Six—pages 38 to 43.

Track Jacks.

Ballast Gang Jacks.

Trip Jacks.

Automatic Lowering Jacks.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

SECTION ONE

JACK CARRIAGE.

SELF-LOWERING SPEED-

CONTROLLED JACKS,

INVERTED TYPES

For light and heavy locomotives, general heavy
duty in roundhouses and shops.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON JACK CARRIAGE

Our experience has shown that the most satisfactory method of trundling a jack is by means of the detachable carriage shown on the opposite page. With this arrangement, should breakage occur due to strain on the wheels when jacking up a load, repairs can be easily made, whereas with the wheels permanently mounted, the shell would be damaged and the wheels rendered useless for further service.

In a shop, where there are several jacks, one of these carriages can be used to handle all of them. Only a minute's time is required to fasten on any jack with a 14-inch diameter base. All jacks do not require wheels and with this device extra cost per jack is eliminated.

A feature of this carriage is the adjustable handle. This permits the operator to easily transport the jack or set it at any desired point under the load. The handle can also be laid down out of the way, or readily removed from the carriage entirely.

Large (10-inch) wheels are used, this allowing the jack to be easily handled over the roughest floors or uneven ground. They are designed exceptionally strong and rugged, which insures against breakage from rough handling.

When using a jack under a load the carriage wheels have ample clearance to prevent their coming in contact with the ground which otherwise would cause breakage.

Every shop using jacks should have one of these carriages. They save time and labor—their cost is very low.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON DETACHABLE JACK CARRIAGE



This Detachable Carriage may be used in connection with any type of Norton Jack having a 14 inch diameter of base.

Price \$15.00



A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON SELF - LOWERING SPEED - CONTROLLED JACKS

75 and 100 Tons Capacity Inverted Type



No. 7262 BB



No. 1262 BB

For use where Small Head combined with High Lifting capacity is required. Small Head insures Jack being placed squarely under load.

Style No.	Capacity	Height	Rise	Diam. of Base	Diam. of Head	Weight	List Price	Tel. or Code Word
7202 BB	75 tons	20 ins.	6 ins.	14 ins.	6 $\frac{1}{4}$ ins.	310 lbs.	\$285.00	Ibex
7242 BB	75 "	24 "	9 "	14 "	6 $\frac{1}{4}$ "	325 "	285.00	Island
7262 BB	75 "	26 "	12 "	14 "	6 $\frac{1}{4}$ "	335 "	285.00	Inlay
1202 BB	100 "	20 "	6 "	14 "	7 $\frac{1}{4}$ "	320 "	305.00	Idea
1242 BB	100 "	24 "	10 "	14 "	7 $\frac{1}{4}$ "	345 "	305.00	Intern
1262 BB	100 "	26 "	12 "	14 "	7 $\frac{1}{4}$ "	360 "	305.00	Invest

Jacks listed above can be supplied with our Jack Carriage, shown on page 11, at an extra cost of \$15.00.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON SELF - LOWERING SPEED - CONTROLLED JACKS

50 Tons Capacity Inverted Type



No. 5361 BB



No. 5261 BB

Light weight is a feature of all NORTON jacks—and this without sacrificing strength or durability.

Style No.	Capacity	Height	Rise	Diam. of Base	Diam. of Head	Weight	List Price	Tel. or Code Word
5241 BB	50 tons	24 ins.	12 ins.	14 ins.	6 ins.	257 lbs.	\$180.00	Idol
5261 BB	50 "	26 "	14 "	14 "	6 "	266 "	180.00	Ivy
5301 BB	50 "	30 "	18 "	14 "	6 "	280 "	200.00	Impel
5361 BB	50 "	36 "	24 "	14 "	6 "	310 "	220.00	Iris

Jacks listed above can be supplied with our Jack Carriage, shown on page 11, at an extra cost of \$15.00.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON SELF - LOWERING SPEED - CONTROLLED JACKS

25 and 35 Tons Capacity Inverted Type



No. 2301 BB



No. 3301 BB

For use where Small Head combined with High Lifting capacity is required. Small Head insures Jack being placed squarely under load.

Style No.	Capacity	Height	Rise	Diam. of Base	Diam. of Head	Weight	List Price	Tel. or Code Word
2261 BB	25 tons	26 ins.	14 ins	12 ins.	4 $\frac{1}{4}$ ins.	155 lbs.	\$125.00	Ink
2301 BB	25 "	30 "	18 $\frac{3}{8}$ "	12 "	4 $\frac{1}{4}$ "	168 "	125.00	Iberia
3261 BB	35 "	26 "	13 $\frac{3}{4}$ "	12 "	5 "	190 "	150.00	Income
3301 BB	35 "	30 "	17 $\frac{1}{2}$ "	12 "	5 "	195 "	160.00	Ice

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATI.COOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

SECTION TWO

SELF-LOWERING SPEED-CONTROLLED, BALL-BEARING JACKS, FOR LIGHT AND HEAVY DUTY

For light and heavy car work, terminal service, Mallet locomotives and general service requiring a large diameter of lifting head and high lift.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON SELF - LOWERING SPEED - CONTROLLED JACK

For Light-Car Work

25-Tons Capacity



Unlike other fast working car jacks, this Norton Self-Lowering Jack is *absolutely safe* under all conditions and the load is always under perfect control. Especially recommended for light car and other work where high speed jacks are required.

Style No.	Capacity	Height	Rise	Diameter of Base	Weight	List Price	Tel. or Code Word
2260 BB	25 tons	26 ins.	14½ ins.	12 ins.	150 lbs.	\$120	Sedan
2300 BB	25 "	30 "	18¾ "	12 "	170 "	125	Sheep

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON SELF - LOWERING SPEED - CONTROLLED JACKS

For Medium Duty Car Work

35-Tons Capacity



You can save time and labor in all classes of car work by using these Jacks. They are positively the fastest working jacks made. You can prove it by using them beside any other make.

SELF-LOWERING SPEED-CONTROLLED JACKS

Style No.	Capacity	Height	Rise	Diameter of Base	Weight	List Price	Tel. or Code Word
3260 BB	35 tons	26 ins.	14 ins.	12 ins.	187 lbs.	\$150	Sauce
3300 BB	35 "	30 "	17 $\frac{5}{8}$ "	12 "	195 "	160	Scot

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON SELF - LOWERING SPEED - CONTROLLED LONG - LIFT JACK

50-Tons Capacity



No. 5360 BB

SELF-LOWERING HIGH-SPEED LONG-LIFT JACK

Style No.	Capacity	Height	Rise	Size of Base	Weight	List Price	Tel. or Code Word
5360 BB	50 tons	36 ins.	24 ins.	16 ins.	317 lbs.	\$220	Sound

This jack is designed especially for Heavy Service where long lift is required, for Dining Cars, Pullmans, Heavy Coaches, Tank Shop and Terminal Service. No other jack combines the speed, absolute safety, long lift and self-lowering feature as this No. 5360 BB.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON SELF - LOWERING SPEED - CONTROLLED JACKS

For Round House, Heavy Loaded Cars and General Use
50-Tons Capacity



Norton Jacks are *better value* than any other Ball-Bearing Jack, because made of better material, have better workmanship, and are absolutely *safe*. Their light weight construction insures ease of handling and spotting under loads.

SELF-LOWERING SPEED-CONTROLLED JACKS

Style No.	Capacity	Height	Rise	Diameter of Base	Weight	List Price	Tel. or Code Word
5200 BB	50 tons	20 ins.	8½ ins.	14 ins.	245 lbs.	\$175	Seed
5240 BB	50 "	24 "	12 "	14 "	248 "	180	Song
5260 BB	50 "	26 "	14 "	14 "	262 "	180	Sand
5300 BB	50 "	30 "	18 "	14 "	285 "	200	Sack

Jacks listed above can be supplied with our Jack Carriage, shown on page 11, at an extra cost of \$15.00.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON SELF - LOWERING SPEED - CONTROLLED JACK

With Foot-Lift, For Mallet Compound Locomotives

100-Tons Capacity



Style No.	Capacity	Height	Rise	Diam. of Base	Diam. of Head	Weight	List Price	Tel. or Code Word
1265 BB	100 tons	26 ins.	12 ins.	14 ins.	10 $\frac{1}{4}$ ins.	420 lbs.	\$310	Ruby

N. B.—This jack is rated for head lift. We do not guarantee the foot-lift beyond one-half the capacity of the jack.

Jacks listed above can be supplied with our Jack Carriage, shown on page 11, at an extra cost of \$15.00.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

SECTION THREE

SELF-LOWERING BRIDGE JACKS

SELF-LOWERING WRECKING JACKS

For wrecking use and all classes of heavy bridge work.

Note: See pages 28 to 37 for hand-lowering bridge and wrecking jacks.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON SELF - LOWERING SPEED - CONTROLLED FOOT - LIFT BRIDGE JACKS

25- and 35-Tons Capacity



Norton Jacks are and always have been *Good Jacks*.

SELF-LOWERING SPEED-CONTROLLED FOOT-LIFT JACKS For Wrecking and Bridge Work

Style No.	Capacity	Height	Rise	Diameter of Base	Weight	List Price	Tel. or Code Word
3225 BB	35 tons	22 ins.	10 ins.	12 ins.	170 lbs.	\$150	Slug
3265 BB	35 "	26 "	13 "	12 "	196 "	155	Snow
2265 BB	25 "	26 "	14 "	12 "	158 "	125	Sod

N. B. — These jacks are all rated for head lift. We do not guarantee the foot-lift beyond one-half the rated capacity of the jack.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON SELF - LOWERING SPEED - CONTROLLED JACKS

With Foot-Lift, for Bridge Work and Wrecking
50- and 75-Tons Capacity



On Norton Self-Lowering, Speed-Controlled Jacks you just press the lowering lever with the thumb and finger and the jack lowers its load fast or slow at the will of the operator—and with perfect safety.

SELF-LOWERING SPEED-CONTROLLED FOOT-LIFT JACKS For Wrecking and Bridge Work

Style No.	Capacity	Height	Rise	Size of Base	Weight	List Price	Tel. or Code Word
5205 BB	50 tons	20 ins.	8½ ins.	14 ins.	245 lbs.	\$185	Shine
5245 BB	50 "	24 "	12 "	14 "	267 "	190	Sky
5265 BB	50 "	26 "	14 "	14 "	275 "	195	Silk
7265 BB	75 "	26 "	12 "	14 "	394 "	305	Pride

N. B.—These jacks are all rated for head lift. We do not guarantee the foot-lift beyond one-half the rated capacity of the jack.

Jacks listed above can be supplied with our Jack Carriage, shown on page 11, at an extra cost of \$15.00.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

SECTION FOUR

**JOURNAL JACKS, BALL-BEARING
JOURNAL JACKS, CONE-BEARING**

GENERAL INDUSTRIAL PURPOSE JACKS (SHORT LIFT)

These jacks are designed to be used on all kinds of journal and inspection work, industrial purposes, etc.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON BALL-BEARING JOURNAL JACKS

**With Patented Sure Stop That Prevents the Screw
from Running Out of the Standard**



This is the very latest design of our 25 and 35 ton journal jacks. Note that the screw turns in a special alloy bronze nut which gives an easy operating jack and insures long life.

The ratchet shaft runs in a bronze bushing and no separate cover plate is used.

The design is extremely rugged yet very light in weight and these jacks will lift every pound of their rated capacity.

Made to handle the heaviest equipment and to withstand hard usage.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

25-TON BALL-BEARING JOURNAL JACKS



Style No.	Capacity	Height	Rise	Weight	List Price	Tel. or Code Word
250	25 tons	10 ins.	5 ins.	34 lbs.	\$36.00	Keg

35-TON BALL-BEARING JOURNAL JACKS



Style No.	Capacity	Height	Rise	Weight	List Price	Tel. or Code Word
350 359	35 tons 35 "	10 ins. 9 "	5 ins. 4 "	44 lbs. 39 "	\$55.00 55.00	King Kid

NOTE. — The lifting handles supplied with the above jacks have one end made into a pinch bar.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON SHORT-LIFT JACKS

CONE-BEARING TYPE



No. 1500
15 Tons



No. 1510
15 Tons



No. 1509
15 Tons



No. 1010
10 Tons



No. 1007
10 Tons



These jacks were designed for General Industrial purposes where short lift and light capacity are required.

For Heavy Duty Railroad Journal Jacks see page 26.

Style No.	Capacity	Height	Rise	Weight	List Price	Tel. or Code Word
1500	15 tons	11 ins.	5 ins.	30 lbs.	\$25	Sun
1510	15 "	9 $\frac{3}{4}$ "	4 "	43 "	25	Stick
1509	15 "	9 "	4 "	27 "	25	Stew
1010	10 "	10 "	5 "	27 "	23	Stump
1007	10 "	7 "	2 $\frac{1}{2}$ "	22 "	23	String

NOTE. — The lifting handles supplied with the above jacks have one end made into a pinch bar.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

SECTION FIVE

**BRIDGE AND WRECKING JACKS,
LOCOMOTIVE AND GENERAL PURPOSE,
INVERTED BALL-BEARING BRIDGE JACKS
GENERAL PURPOSE JACKS,
(With Cone-Bearings)
PUSH AND PULL JACKS,
TRAVERSING BASE JACKS,**

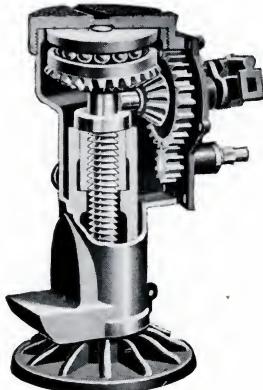
These jacks are of the hand-lowering type and can be used for all classes of light and heavy bridge service. Also used for industrial purposes such as electric plants, stone quarries, handling heavy machinery, etc.

A. O. NORTON
INCORPORATED

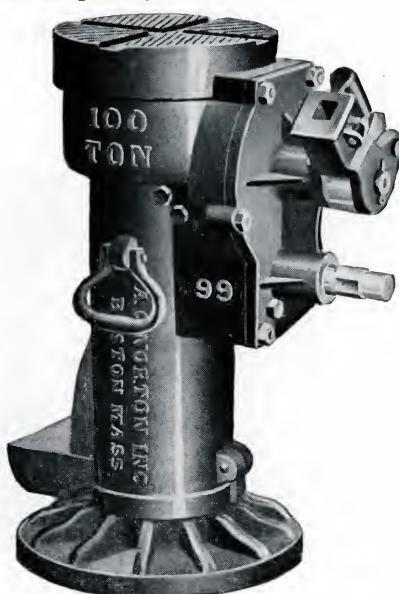
BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON BALL-BEARING BRIDGE AND WRECKING JACKS (Compound Geared)

75- and 100-Tons Capacity



Sectional View of Norton
75- and 100-Ton Jack



No. 99
100-Ton Capacity

BRIDGE AND WRECKING JACKS

Style No.	Capacity	Height over All	Rise	Diam. of Base	Diam. of Head	Weight	List Price	Tel. or Code Word
93	75 tons	27 ins.	11 $\frac{3}{8}$ ins.	14 ins.	10 $\frac{1}{2}$ ins.	329 lbs.	\$200	Absurd
99	100 "	27 "	12 "	14 "	10 $\frac{1}{2}$ "	375 "	300	Almond

Jacks listed above can be supplied with our Jack Carriage, shown on page 11, at an extra cost of \$15.00.

These jacks are designed for extra-heavy bridge and other work, and the capacity is fully guaranteed.

When raising light load (30 to 40 tons) on compound/geared jacks, use ratchet on *upper* shaft, which gives *more speed*.

When full power of jack is required, use ratchet on *lower* shaft.

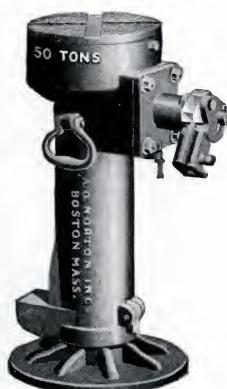
N. B.—These jacks are all rated for head lift. We do not guarantee the foot-lift beyond one-half the rated capacity of the jack.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON BALL-BEARING BRIDGE AND WRECKING JACKS

50-Tons Capacity



50-Ton Bridge Jack

50-TONS CAPACITY

Capacity	Height	Rise	Diameter of Base	Diameter of Head	Weight	List Price	Tel. or Code Word
50 tons	24 ins.	9 $\frac{5}{8}$ ins.	14 ins.	10 $\frac{1}{4}$ ins.	266 lbs.	\$150.00	Alto
50 "	27 "	13 $\frac{3}{8}$ "	14 "	10 $\frac{1}{4}$ "	298 "	150.00	Anchor

N. B. — These jacks are all rated for head lift. We do not guarantee the foot-lift beyond one-half the rated capacity of the jack.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON BALL-BEARING BRIDGE AND WRECKING JACKS

15-25- and 35-Tons Capacity



22-inch Bridge Jack
15-tons Capacity



22-inch Bridge Jack
25-tons Capacity



26-inch Bridge Jack
35-tons Capacity

15-, 25-, AND 35-TONS CAPACITY

Capacity	Height	Rise	Size of Base	Diameter of Head	Weight	List Price	Tel. or Code Word
15 tons	22 ins.	10 ins.	7 $\frac{1}{2}$ x 7 $\frac{1}{2}$ ins.	5 $\frac{1}{2}$ ins.	105 lbs.	\$60.00	Abyss
25 "	26 "	14 $\frac{3}{8}$ "	8 x 10 "	5 $\frac{1}{2}$ "	157 "	96.00	Atlas
25 "	22 "	10 $\frac{1}{4}$ "	8 x 10 "	5 $\frac{1}{2}$ "	140 "	90.00	Adjust
35 "	22 "	10 $\frac{5}{8}$ "	8 x 10 $\frac{1}{2}$ "	6 $\frac{1}{2}$ "	171 "	130.00	Absent
35 "	26 "	14 "	8 x 10 $\frac{1}{2}$ "	6 $\frac{1}{2}$ "	201 "	138.00	Amber

N. B.—These jacks are all rated for head lift. We do not guarantee the foot-lift beyond one-half the rated capacity of the jack.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON BALL-BEARING LOCOMOTIVE AND GENERAL PURPOSE JACKS

25- and 35-Tons Capacity



Style N. A., 25 tons
Height, 26 inches



Style C., 35 Tons
Height, 26 inches



No. 100, 35 Tons
Height, 20 inches

25-TON BALL-BEARING JACKS

Style	Capacity	Height	Rise	Diameter of Base	Weight	List Price	Tel. or Code Word
N. A.	25 tons	20 ins.	8 ins.	12 ins.	133 lbs.	\$80.00	Canon
N. A.	25 "	26 "	14 "	12 "	164 "	90.00	Celery

35-TON BALL-BEARING JACKS

Style	Capacity	Height	Rise	Diameter of Base	Weight	List Price	Tel. or Code Word
No. 100 C	35 tons	20 ins.	8½ ins.	14 ins.	160 lbs.	\$125.00	Clay
	35 "	26 "	13 "	12 "	175 "	125.00	Clio

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON DOUBLE-SPEED BALL-BEARING JACK **With Foot Lift**

15-Tons Capacity



Style F, 15 Tons

STYLE F, BALL-BEARING JACK

Style	Capacity	Height	Rise	Size of Base	Weight	List Price	Tel. or Code Word
F	15 tons	24 ins.	12 ins.	8" x 9"	128 lbs.	\$65.00	Fruit

This jack is designed to give double speed over our standard type. It is strongly built and is especially adapted to electric plants, power houses and electric railways. Also for handling heavy machinery, stone, etc.

N. B.—This jack is rated for head lift. We do not guarantee the foot-lift beyond one-half the rated capacity of the jack.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON BALL-BEARING INVERTED BRIDGE JACK

12-Tons Capacity



A new NORTON jack especially designed for certain bridge work such as lifting stringers, etc. Light in weight, finely built, and fast in operation. The foot is made short on one end so that the jack can be located close to adjoining sills, etc. A jack that can be adapted to a multitude of other uses.

Supplied with a 39-inch steel handle, one end of which is made into a pinch-bar.

Style No.	Capacity	Height	Rise	Size of Base	Weight	Code Word	List Price
912	12 tons	14 ³ ₄ in.	9 in.	6x7 ¹ ₂ in.	40 lbs.	Frank	Price on application

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

**NORTON GENERAL PURPOSE JACKS
WITH CONE BEARINGS**

**10- and 15-Tons
Capacity**



Style Y, 15 Tons
Height, 20 inches



Style S, 15 Tons Style G, 15-Ton Foot-Lift
Height, 21 $\frac{7}{8}$ inches Jack



Style N. J., 10 Tons
Height, 14 inches

10- AND 15-TON CONE-BEARING JACKS

Style	Capacity	Height over All	Rise	Size of Base (ins.)	Weight	List Price	Tel. or Code Word
S	15 tons	21 $\frac{7}{8}$ ins.	11 $\frac{1}{2}$ ins.	8 $\frac{1}{2}$ dia.	70 lbs.	\$34.00	Street
Y	15 "	20 "	8 $\frac{1}{2}$ "	7 $\frac{1}{2}$ x 7 $\frac{1}{2}$	98 "	44.00	Gent
N. J.	10 "	14 "	5 $\frac{3}{4}$ "	6 x 7 $\frac{1}{2}$	65 "	31.00	Gale
G	15 "	22 "	9 $\frac{1}{2}$ "	7 $\frac{1}{2}$ x 7 $\frac{1}{2}$	105 "	45.00	Ham

N. B. — These jacks are rated for head lift. Not more than one-half the rated capacity should be lifted with the foot.

A General Purpose Jack for carpenters and builders, boiler makers, truckmen, etc.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON BALL-BEARING TRAVERSING JACKS For Tool Car Equipment



15-inch Traversing Base
Height, 4 inches

Price List of Traversing Base Only

Traverse	Weight	List Price	Tel. or Code Word
20 ins.	140 lbs.	\$50.00	Bacon
15 "	75 "	40.00	Battle



Ball-Bearing Traversing Jack

BALL-BEARING TRAVERSING JACKS, COMPLETE

Style of Jack	Capacity	Height over All	Rise	Traverse	List Price	Tel. or Code Word
No. 126	15 tons	30 ins.	13 ins.	15 ins.	\$110.00	Boom
" 124	15 "	26 "	10 "	15 "	100.00	Band
" 120	15 "	24 "	9 "	15 "	100.00	Bag
" 118	15 "	22 "	7 "	15 "	100.00	Blow
" 220	25 "	24 "	9 "	15 "	120.00	Bike
" 224	25 "	28 "	11 "	20 "	135.00	Bail
" 226	25 "	30 "	13 "	20 "	140.00	Balloon
" 320	35 "	24 "	8 "	20 "	175.00	Bean
" 326	35 "	30 "	13 "	20 "	175.00	Bated
" 520	50 "	24 "	5 "	20 "	200.00	Bell
" 524	50 "	28 "	9 "	20 "	200.00	Bolt
" 526	50 "	30 "	11 "	20 "	200.00	Bet
" 527	50 "	31 "	13 "	20 "	200.00	Balsam
" 727	75 "	31 "	12 "	20 "	250.00	Bone

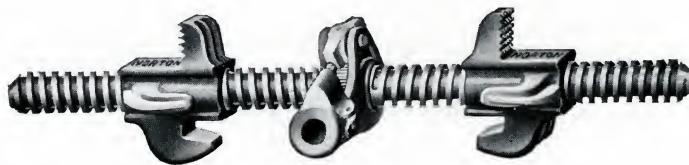
These jacks can be taken off the bases and used separately if desired. It is the most Complete Tool-Car Outfit in the market.

Any Size, Height or Capacity Jack Fitted to either Base

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NORTON PUSH AND PULL JACKS



For steel car repair work, bridge, structural and wreck train use, straightening beams, etc.

Cast steel nuts are largely proportioned and provided with side hooks for pulling with chains or cables. The screw is 2" in diameter and made of special alloy steel, heat treated. Very strongly built.

Note that minimum distance between jaws for pushing is $5\frac{3}{4}$ inches, which permits this jack to be used in close places.

Jack is furnished with 30-inch steel handle, one end of which is forged into a pinch-bar.

Style	Pushing	Pulling	Weight	Code Word	List Price
28	<i>Capacity:</i> 12 tons on jaws Distance between jaws $5\frac{3}{4}$ in. minimum, 24 in. maximum.	<i>Capacity:</i> 15 tons on side hooks 12 tons on beam hooks Distance between hooks $5\frac{1}{2}$ in. minimum, $23\frac{3}{4}$ in. maximum.	48 lbs.	Push	\$25.00

**A. O. NORTON
INCORPORATED**

**BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.**

SECTION SIX

TRACK JACKS

BALLAST GANG JACKS

TRIP JACKS

AUTOMATIC LOWERING JACKS

(Rack Type)

These jacks were designed primarily for track use but are adaptable to other purposes such as emergency work on electric railways, industrial uses, etc.

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NO. 1 TRACK OR TRIP JACK

10-Tons Capacity

The leverage is compound, double-acting, lifting the load half a notch on both upward and downward strokes. Load can be instantly dropped from any elevation at will of operator. It is positive, speedy, and durable. This is the recognized standard Track Jack. Its construction conforms strictly to the requirements of the Roadmasters' Association, and has been adopted by the leading railroads of America.

We recommend Trip Jacks for track work only.

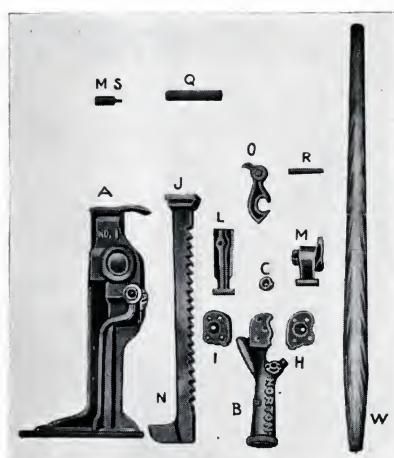


NO. 1 TRACK OR TRIP JACK

Capacity 10 Tons

Capacity in Tons	Height of Bar Down, Inches	Rise of Bar, Inches	Height of Bar Raised, Inches	Size of Bar, Inches	Weight in Pounds	List Price	Tel. or Code Word
10	24	13 $\frac{1}{2}$	37 $\frac{1}{2}$	1 $\frac{1}{4}$ x 1 $\frac{1}{2}$	62	\$22.00	Umpire

PARTS OF NO. 1 TRIP JACK



Symbol	Name of Part	Price
A	Base with Bushings.....	\$10.00
B	Socket Lever with Side Plates	5.00
C	Bushing (two), each.....	.25
H	Right-hand Side Plate.....	.30
I	Left-hand Side Plate.....	.30
J	Top of Rack.....	.30
L	Long Pawl.....	1.50
M	Short Pawl.....	1.50
N	Steel Rack.....	4.50
O	Trip75
Q	Fulerum Pin.....	.30
R	Side Plate Rivet (two), each.	.10
MS	Short Pawl Screw.....	.15
W	Wood Handle.....	1.00

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NO. 2
AUTOMATIC LOWERING JACK
Capacity 10 Tons

This is certainly a most popular and useful jack, being suitable for all general lifting purposes. It is the recognized standard for Steam and Electric car lines, being used in track construction; also a car jack in cases of emergency, such as derailment or accident where cars have to be lifted quickly and lowered gradually. Its operation is easy and simple. The load is moved up or down half a notch at each stroke on both upward and downward movements of the lever. The direction is easily controlled by the eccentric at side of the frame. It has no trip, consequently cannot drop a load through carelessness. The capacity is ten tons. A number of Electric Railway Companies have made this jack part of the equipment of each car, and report gratifying results.

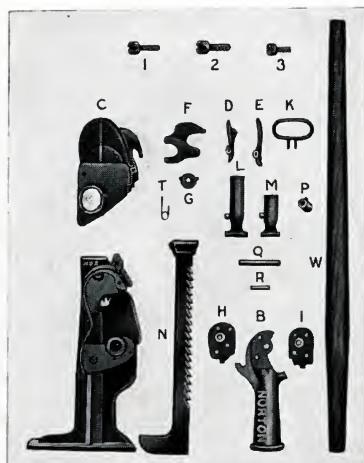
This jack will operate at any angle.



NO. 2 AUTOMATIC LOWERING JACK
Capacity 10 Tons

Capacity	Height of Bar Down	Rise of Bar	Height of Bar Raised	Size of Bar Inches	Weight	List Price	Tel. or Code Word
10 tons	21 ins.	10 ins.	31 ins.	1 $\frac{5}{8}$ x 1 $\frac{1}{2}$	65 lbs.	\$25.00	Klondyke

PARTS OF NO. 2
AUTOMATIC LOWERING JACK



Symbol	Name of Part	Price
A	Base with Bushings and Handle	\$10.00
B	Socket Lever with Side Plates..	4.50
C	Shield	1.00
D	Short Pawl Spring Lever.....	.50
E	Long Pawl Spring Lever.....	.50
F	Lowering Block.....	.80
G	Eccentric30
H	Right-hand Side Plate.....	.30
I	Left-hand Side Plate.....	.30
J	Top of Rack.....	.50
K	Carrying Handle.....	.30
L	Long Pawl.....	1.60
M	Short Pawl.....	1.60
N	Steel Rack.....	5.00
P	Bushing (two), each.....	.25
Q	Fulcrum Pin.....	.50
R	Side Plate Rivet (two), each...	.10
T	Spring (two), each.....	.10
W	Wood Handle.....	1.00
1	Shoulder Screw (four), each...	.15
2	Long Shield Screw.....	.15
3	Short Shield Screw (three), each	.10

A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NO. 6 B BALLAST GANG TRIP JACK

Capacity 15 Tons

This is our most powerful double-acting Trip Jack, and has the greatest rise of any double-action jack. It raises the load 19 inches. We can freely recommend this as the best Ballast Gang Jack on the market, or for other uses where a large, powerful jack with great rise is needed. As indicated by its name, it has the "Trip" attachment whereby the load can be dropped in an instant. By each stroke, up or down, of the lever the load can be raised one-half notch. Its height is 31 inches, weight, 105 pounds.

Trip Jacks are recommended for track work only.



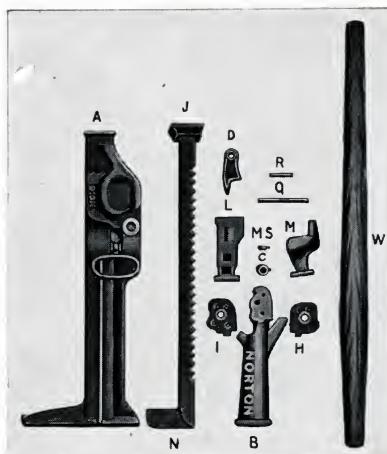
NO. 6 BALLAST GANG TRIP JACKS

Capacity 15 Tons

Capacity in Tons	Height of Bar Down, Inches	Rise of Bar Inches	Height of Bar Raised, Inches	Size of Bar, Inches	Weight in Pounds	List Price	Tel. or Code Word
15	31	19	50	1 $\frac{1}{2}$ x 1 $\frac{5}{8}$	105	\$32.00	Success

PARTS OF NO. 6 B BALLAST GANG TRIP JACKS

Symbol	Name of Part	Price
A	Base with Bushings and Handle..	\$16.00
B	Socket Lever with Side Plates..	6.00
C	Bushings (two), each.....	.25
H	Right-hand Side Plate.....	.30
I	Left-hand Side Plate.....	.30
J	Top of Rack.....	.60
K	Carrying Handles (two), each...	.30
L	Long Pawl.....	2.00
M	Short Pawl.....	2.00
N	Steel Rack	9.00
O	Trip75
Q	Fulcrum Pin.....	.60
R	Side Plate Rivet (two), each....	.10
MS	Short Pawl Screw.....	.10
W	Wood Handle.....	1.25



A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NO. 19
AUTOMATIC
LOWERING JACK
Capacity 15 Tons

This jack is especially designed for car repairing. It is staunch and well built. It is tall enough for any requirement and not easily deranged. Like all our jacks, it has a foot at the bottom of the rack to grapple low set loads. It lifts and lowers on the downward stroke of the lever only. The direction is reversed by the eccentric on the side. It operates at any angle.

PARTS OF
NO. 19 AUTOMATIC LOWERING
JACK

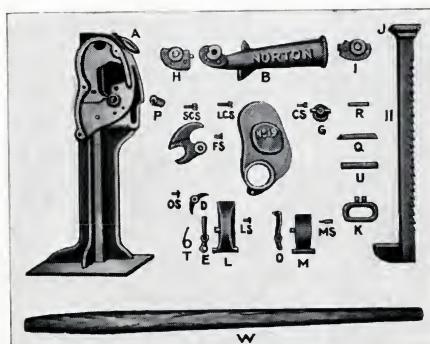
Symbol	Name of Part	Price
A	Base with Bushings and Handle	\$15.00
B	Socket Lever with Side Plates	.50
C	Shield	.10
D	Short Pawl Spring Lever	.50
E	Long Pawl Spring Lever	.50
F	Lowering Block	.80
G	Eccentric	.30
H	Right-hand Side Plate	.30
I	Left-hand Side Plate	.30
J	Top of Rack	.70
K	Carrying Handle	.30
L	Long Pawl	2.25
M	Short Pawl	2.25
N	Steel Rack	9.25
O	Auxiliary Lever	.20
P	Bushing (two), each	.40
Q	Fulerum Pin	.60
R	Side Plate Rivet (two), each	.10
T	Spring (two), each	.15
U	Pawl Pin	.30
W	Wood Handle	1.25
OS	Auxiliary Lever Screw	.10
SCS	Short Shield Screw (three), each	.10
LCS	Long Shield Screw	.15
LS	Long Pawl Screw	.15
MS	Short Pawl Screw	.15
GS	Eccentric Screw	.15
FS	Lowering Block Screw	.15



NO. 19 AUTOMATIC LOWERING
JACK

Capacity 15 Tons

Capacity in Tons	Height of Bar Down, Inches	Rise of Bar, Inches	Height of Bar Raised, Inches	Size of Bar, Inches	Weight in Pounds	List Price	Tel. or Code Word
15	28	17 $\frac{1}{2}$	45 $\frac{1}{2}$	1 $\frac{3}{4}$ x 1 $\frac{7}{8}$	110	\$35.00	Unique



A. O. NORTON
INCORPORATED

BOSTON, MASSACHUSETTS, U. S. A.
COATICOOK, PROV. QUEBEC, CAN.
CHICAGO, ILL., 920 SO. MICHIGAN AVE.

NO. 20
BALLAST GANG TRACK JACK

This jack is well designed and similar to the No. 6 B, except that it is single-acting and raises the load on the down stroke of lever only. We recommend it to those who require a strong, single-acting trip jack.



NO. 20 BALLAST GANG TRACK JACK

Capacity	Height of Bar Down	Rise of Bar	Height of Bar Raised	Size of Bar Inches	Weight	List Price	Code Word
15 tons	31 ins.	19 ins.	50 ins.	1 $\frac{5}{8}$ x 1 $\frac{7}{8}$	106 lbs.	\$32.00	Superior

PARTS OF
NO. 20 TRIP JACK

Symbol	Name of Part	Price
A	Base with Bushings and Handles.....	\$16.00
B	Socket Lever with Side Plates.....	6.00
H	Right-hand Side Plate	.30
I	Left-hand Side Plate	.30
J	Top of Rack.....	.60
K	Carrying Handles (two), each.....	.30
L	Long Pawl.....	2.00
M	Short Pawl.....	2.00
N	Steel Rack.....	9.00
O	Trip75
P	Bushing (two), each	.25
Q	Fulcrum Pin.....	.60
R	Side Plate Rivet (two), each.....	.10
U	Pawl Pin.....	.30
W	Wood Handle.....	1.25
MS	Short Pawl Screw.....	.10

